

CLAIMS

1. Follower for a continuously controlled window lifter which is mounted on a guide plate fixed in a motor vehicle and is displaceable along an adjusting path formed by a guide way, with
5 at least a first guide element which is mounted displaceable on the first side of the guide plate, and at least a second guide element which is mounted displaceable on the second side of the guide plate,
characterised in that
10 the second guide element is held in an assembly position relative to the first guide element and/or to another element of the follower through associated engagement regions, and
at least for assembly the first guide element and the second guide element are mounted movable relative to each other so that at least the second guide element
15 can be brought from the assembly position into a functioning position on the guide way of the guide plate.

2. Follower according to claim 1, **characterised in that** the engagement regions are
20 designed as a releasable positive locking connection for secure hold in the assembly position.

3. Follower according to claim 1, **characterised in that** the engagement regions are
25 formed as a releasable force locking connection for secure hold in the assembly position.

4. Follower according to one of the preceding claims, **characterised in that** the
30 engagement regions are formed as a rupturable regions for secure hold in the assembly position.

5. Follower according to one of the preceding claims, **characterised in that** for
35 movable bearing the first guide element and the second guide element are mounted rotatable relative to each other.

6. Follower according to one of the preceding claims, **characterised in that** for movable bearing the first guide element and the second guide element are mounted displaceable relative to each other, more particularly displaceable in translation relative to each other.

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7. Follower according to one of the preceding claims, **characterised in that** in the functioning position the first guide element and the second guide element are fixed relative to each other through a further positive locking and/or force locking connection.

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8. Follower according to claim 7, **characterised in that** a locking element is provided for locking the fixing of the functioning position.

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9. Follower according to one of the preceding claims, **characterised in that** the second guide element has as a positive locking engagement region a detent element, more particularly a detent nose or a detent groove.

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10. Follower according to one of the preceding claims, **characterised in that** the follower has several slide members which each have at least a first guide element and at least a second guide element, at least the second guide elements of the slide members are mounted movable, more particularly rotatable, relative to a lifting rail, the second guide elements are positioned relative to each other and/or to the lifting rail in the assembly position, and the guide elements can be moved, more particularly rotated from the assembly position into the functioning position.

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11. Follower according to claim 10, **characterised in that** the lifting rail has engagement regions more particularly positioning detent elements which act with the engagement regions of the second guide elements or with the engagement regions of the first guide elements to produce a secure hold in the assembly position.

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12. Follower according to claim 11, **characterised in that** the positioning detent element of the lifting rail is designed as a pin which can be inserted into the lifting rail and which has in particular rupturable region which can be broken during assembly.

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13. Follower according to one of the preceding claims, **characterised in that** for the movable bearing the second guide element is mounted rotatable on the first guide element or on a stepped bolt of the follower.

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14. Guide plate for a continuously controlled window lifter in a motor vehicle, with

- a guide way for guiding a follower of the window lifter and for adjusting the follower along an adjusting path which is formed by the guide way, and
- a guide web of the guide way for guiding the follower in the plane of the guide way along the adjusting path,

characterised in that
the height of the guide web of the guide way is reduced in a region for assembling the follower.

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15. Guide plate according to claim 14, **characterised in that** the guide way has either side of the guide plate and on the guide web track faces each associated with at least one guide element of the follower, and the guide plate has an opening in the guide way along the adjusting path through which the follower can be fitted into the region of the assembly.

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16. Guide plate for a continuously controlled window lifter of a motor vehicle, with

- a guide way for guiding a follower of window lifter and for adjusting the follower along an adjusting path formed by the guide way, whereby
- the guide way has either side of the guide plate web faces which are each associated with at least one guide element of the follower
- the guide way has an opening in the guide plate which is engaged by the follower,

characterised in that
in an extension of the guide way in the guide plate there is a region for fitting the follower, and the opening is widened out in this region to enable the follower to be

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pushed onto the guide way for assembly.

17. Follower for a continuously controlled window lifter which is mounted on a guide
5 plate fixed in a motor vehicle, more particularly according to claim 16, and is
displaceable along an adjusting path formed through a guide way, with guide
elements which are mounted sliding on the guide way either side of the guide
plate, wherein

at least a first guide element is mounted sliding on the first side of the guide plate,
10 at least a second guide element is mounted sliding on the second side of the guide
plate and between two guide webs of the guide way there is a third guide element
whose width extends between the guide webs,

characterised in that

the width of the third guide element can be adjusted by an expanding element or
15 by a mechanism adjusting the width of the third guide element, more particularly to
the distance between the two guide webs.

18. Continuously controlled window lifter with a follower according to one of claims 1
20 or 17 and a guide plate according to one of claims 14 or 16 wherein the follower
can be driven along the guide way by means of a cable or a Bowden cable.

19. Continuously controlled window lifter according to claim 18, **characterised in that**
25 the second guide element is able to swivel or rotate into an assembly position in
which this second guide element can be brought through an opening in the guide
plate associated with the guide way at the side of the first side of the guide plate to
the second side of the guide plate.

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20. Continuously controlled window lifter for a motor vehicle, with
- a follower which is connected to the window pane and can be driven by means of
a drive mechanism for adjusting the window pane, and
- a guide way for adjusting the follower along an adjusting path (z-direction) formed
35 by the guide way and for guiding the follower in a first guide direction substantially
perpendicular to the adjusting direction of an adjusting path section and for guiding
the follower in a second guide direction substantially perpendicular to the adjusting

direction of the adjusting path section in which the first guide direction forms a variable angle over the adjusting path relative to the second guide direction, wherein

- the guide way has an opening in a plate of the window lifter through which the follower is passed,
- the guide way has for guidance either side of the plate web faces which are associated with guide elements of the follower,
- the follower has at least a first guide element for guidance in the first guide direction (x-direction) and a second guide element for guidance in the second guide direction (y-direction), and
- these guide elements and/or other elements of the follower have a bearing by means of which the first guide element and second guide element are mounted movable relative to each other, more particularly in dependence on the variable angle.

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21. Continuously controlled window lifter according to claim 20, **characterised in that** the first guide element and the second guide element are mounted to swivel or rotate relative to each other by means of a swivel bearing or a rotational bearing.

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22. Continuously controlled window lifter according to one of claims 20 or 21, **characterised in that** the first guide element is mounted on a ball joint and the ball joint is designed integral with the second guide element.

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23. Continuously controlled window lifter according to one of claims 20 or 21, **characterised in that** the first guide element is mounted on a domed bearing of the second guide element.

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24. Continuously controlled window lifter according to one of claims 20 or 21, **characterised in that** the first guide element is mounted on a tilting joint of the second guide element.

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25. Continuously controlled window lifter according to one of claims 20 or 21, **characterised in that** the first guide element is mounted tilted on a stepped bolt of the follower which engages through the opening in the guide plate.

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26. Continuously controlled window lifter of a motor vehicle with a follower and a guide plate according to one of the preceding claims, wherein

- the follower for guidance along the adjusting path has several slide members which are mounted to slide on at least a first, a second and a third guide way of the guide plate and engage through an opening in the guide way
- the follower is guided in a first guide direction substantially orthogonal to the surface of the guide plate and through restrictions of the opening of the guide way in a second guide direction,

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characterised in that

- the opening of the (outer) first guide way is wider than that of the second and third guide ways, and
- the follower is guided in the second guide direction only through the second guide way and the third guide way.

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